Abstract

Compounds, composition and method for ameliorating alcohol or drug dependency withdrawal syndromes and withdrawal-induced brain damage are disclosed. In particular, a series of N-substituted-4-uredo-5,7-dihalo-2-carboxy quinoline compounds are disclosed having combined properties as antagonists of voltage-sensitive sodium channels (VSNaC) and as selective competitive antagonists at the strychnine-intensive glycine site of N-methyl-D-aspartate (NMDA) receptors. The disclosed compounds prevent or reduce the signs and symptoms of neurohyperexcitability and particularly the neurohyperexcitability associated with withdrawal syndrome manifested by patients upon withdrawal from chronic use of dependence inducing agents (e.g. ethanol, barbiturates, opiates etc.). The combined actions of the disclosed compound on VSNaC and NMDA receptors also impart properties to these compounds that are important in preventing and reducing excitotoxic neurodegeneration and reducing anxiety without the undesirable CNS depressant side-effects of agents hitherto employed for these purposes.